

Date: 25/04/2025  
Prepared For: Bookmark Reading  
Prepared By: Ruben Pires



## Introduction

This is Phase 1 of a **full declarative Salesforce build** I’ve been developing in response to Bookmark’s mission and the Salesforce Administrator role. I’ve taken the initiative to design what I believe could be the backbone of your CRM system—fully aligned to the needs of programme staff, volunteers, and leadership—**without requiring any Apex, DLRS, or unmanaged code.**

The aim here isn’t just to show technical skill, but to demonstrate real understanding of how Bookmark operates and what kind of system would actually work on the ground. I’ve built this directly in Salesforce, **focusing on practical flows, clean architecture, and future-proof rollups that prioritise maintainability and integrity.**

Phase 1 covers student tracking and reading session infrastructure—what I see as the core layer everything else builds on.

## Phase 1 Overview

This report summarizes the successful completion of Phase 1 for the Literacy Tracker Salesforce application. This phase focused on building the core schema, essential automation, user interface elements, and the initial security model.

# Index

1. [Core Data Model \(Schema\)](#)
2. [Key User Experience: Student Record & Session Entry](#)
  - 2.1. [Student Path Component](#)
  - 2.2. [Log Reading Session Action](#)
  - 2.3. [Session History List](#)
3. [Core Automation \(Flows\)](#)
  - 3.1. [Flow 1: Book Creator](#)
  - 3.2. [Flow 2: Quick Session Entry](#)
  - 3.3. [Flow 3: Student Last-Session Updater](#)
4. [Security & Access Models](#)
5. [Next Steps](#)

**Demo Available at:** <https://rubenpires-dev-ed.develop.lightning.force.com/>

**Login Credentials:**

**Username:** jvolu@ruben.pires

**Password:** VOLUNTEER123

## Available Demo Activities

- Create, edit, and delete Students, Books, and Locations  
Run **Quick Session Entry** flow directly from the Student record page

# 1. Core Data Model (Schema)

Phase 1 established the fundamental data structure. The core custom objects created are:

- 1) **Student\_\_c** 2) **Reading\_Session\_\_c** 3) **Book\_\_c** 4) **Program\_Location\_\_c**

**Student\_\_c:** Represents the child participant.

Tracks key calculated metrics like:

- **Last\_Session\_DateTime\_\_c,**
- **Latest\_Session\_Focus\_Area\_\_c,**
- **Sessions\_Completed\_\_c,**
- **Total\_Reading\_Minutes\_\_c,**
- and the student's **Current\_Reading\_Level\_\_c**

The screenshot shows the 'Student' object schema with the following fields:

Field Name	Field Type
Created By	Lookup(User)
Current reading level	Picklist
Days since last session	Formula (Number)
Last Modified By	Lookup(User)
Last session date	Formula (Date)
Last session datetime	Date/Time
Last session focus area	Text(255)
lt_student Name	Text(80)
Owner	Lookup(User+1)
sessions completed	Roll-Up Summary (COUNT Reading Session)
status	Picklist
total reading minutes	Roll-Up Summary (SUM Reading Session)

**Reading\_Session\_\_c:** Represents an individual reading session.

This object has a **Master-Detail relationship to Student\_\_c.** Ensuring sessions are tightly linked to participants and enabling **roll-up summaries on the Student record.**

The screenshot shows the 'Reading Session' object schema with the following fields:

Field Name	Field Type
book	Lookup(Book)
completion status	Picklist
Created By	Lookup(User)
duration minutes	Number(3, 0)
focus area	Picklist
Last Modified By	Lookup(User)
lt_reading session Name	Text(80)
notes	Long Text Area(1000)
Program Location	Lookup(Program Location)
reading mode	Picklist
session datetime	Date/Time
student	Master-Detail(Student)

**Book\_\_c:** A catalogue of reading materials used in sessions.  
**Reading\_Session\_\_c** has a **Lookup relationship to Book\_\_c**.

Book	
author	Text(255)
Created By	Lookup(User)
description	Long Text Area(1000)
ISBN	Text(13)
Last Modified By	Lookup(User)
lt_book Name	Text(80)
Owner	Lookup(User+1)
reading level	Picklist

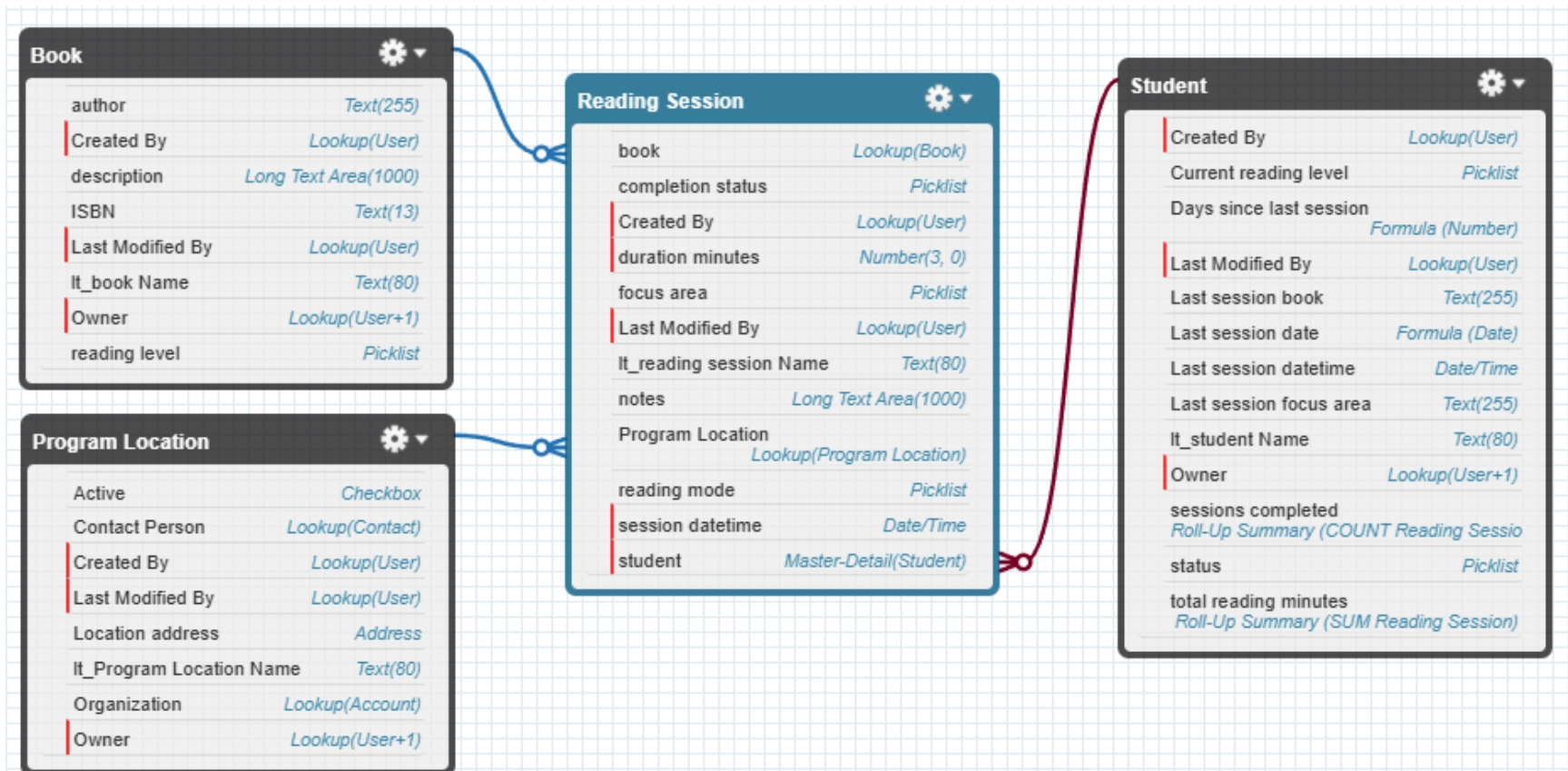
**Program\_Location\_\_c:** Represents the physical venues where sessions occur.

**Reading\_Session\_\_c** has a **Lookup relationship to Program\_Location\_\_c**.

This object also includes lookups to standard **Account (for the parent Organization)** and **Contact (for the specific Contact Person)** objects.

Program Location	
Active	Checkbox
Contact Person	Lookup(Contact)
Created By	Lookup(User)
Last Modified By	Lookup(User)
Location address	Address
lt_Program Location Name	Text(80)
Organization	Lookup(Account)
Owner	Lookup(User+1)

Key relationships and automated fields provide immediate value by **summarizing student engagement and recency directly on the Student record.**



## 2. Key User Experience: Student Record & Session Entry

The primary user interface for interacting with student data and initiating session logging in Phase 1 is the **Student\_\_c Lightning Record Page**:

The screenshot displays the Student\_\_c Lightning Record Page. At the top, a header bar shows the student's name "John" and a red icon. Below this, a progress bar indicates the current reading level: "Emerging Reader" (highlighted with a yellow box), "Developing Reader", and "Fluent Reader". A button labeled "Mark Current reading level as Complete" is also highlighted. The main content area is divided into tabs: "Details" (selected), "Reading History", and "Related". Under the "Details" tab, there are two sections: "Information" and "Program Details". The "Information" section contains fields for "It\_student Name" (John), "Owner" (Ruben Dires), "Last session book" (Harry Potter 3), "status" (Active), and "total reading minutes" (559). The "Program Details" section contains fields for "Last session datetime" (24/04/2025, 17:05), "Last session date" (24/04/2025), "Days since last session" (1), and "sessions completed" (10). All these fields are highlighted with yellow boxes.

Field	Value
It_student Name	John
Owner	Ruben Dires
Last session book	Harry Potter 3
status	Active
total reading minutes	559
Last session datetime	24/04/2025, 17:05
Last session date	24/04/2025
Days since last session	1
sessions completed	10

## 2.1. Student Path Component:

A Path component is configured based on the **Student\_\_c**. It provides staff with an at-a-glance view of the student's progress stage.

Key fields, such as **Current\_Reading\_Level\_\_c**, **Latest\_Session\_Focus\_Area\_\_c** and **Last\_Session\_Date\_\_c**, are displayed directly within the Path stages, along with configurable guidance text for staff.

The screenshot displays the Student Path Component interface. At the top, a progress bar shows three stages: 'Emerging Reader' (active, green), 'Developing Reader' (inactive, grey), and 'Fluent Reader' (inactive, grey). Below the progress bar, the 'Current reading level: Emerging Reader' is displayed. To the right of this, there is a blue button labeled '✓ Mark Current reading level as Complete'. On the left side, under the heading 'Key Fields', there is a list of fields with their values: 'Last session date' (24/04/2025), 'Last session focus area' (Fluency), 'total reading minutes' (559), 'sessions completed' (10), and 'Last session book' (Harry Potter 3). Each field has a small edit icon to its right. On the right side, under the heading 'Guidance for Success', there is a yellow box containing the text: 'Encourage reading aloud. Introduce simple CVC words. Log session duration accurately.'

✓

Emerging Reader

Developing Reader

Fluent Reader

Current reading level: Emerging Reader

✓ Mark Current reading level as Complete

Key Fields

Last session date  
24/04/2025

Last session focus area  
Fluency

total reading minutes  
559

sessions completed  
10

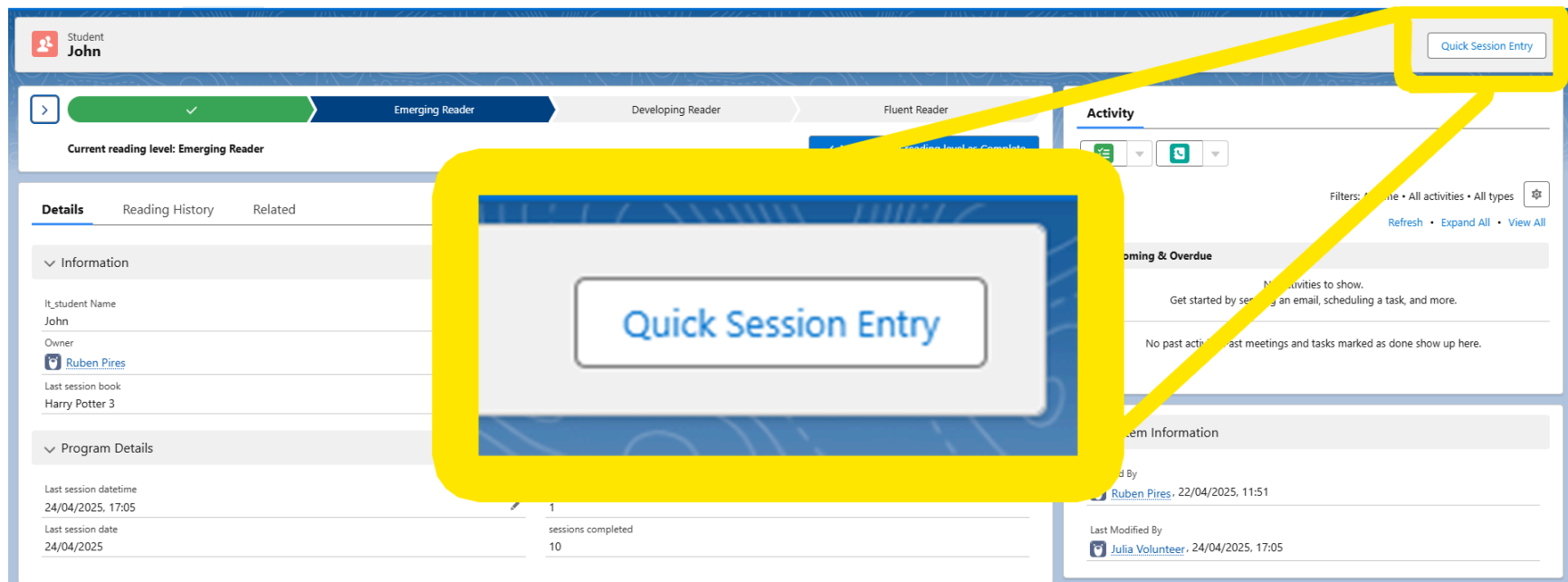
Last session book  
Harry Potter 3

Edit Guidance for Success

Encourage reading aloud. Introduce simple CVC words. Log session duration accurately.

## 2.2 Log Reading Session Action:

A prominent action button on the Student page launches the Quick Session Entry screen flow.





## 2.3 Session History List

A tab with previous Reading Sessions is also available for staff allowing for quick reference, displaying key fields like session date, duration, book from session, session status and location. The intent is to provide additional context and continuity for their work with students.

Details
**Reading History**
Related

**Reading Sessions (10)**

10 items • Sorted by session datetime • Updated a few seconds ago

session datetime ↓

duration ...

book

completion status

Program Location

1	24/04/2025, 17:05	40	Harry Potter 3	Read Aloud (Volunteer to Student)	Local Library Reading Room
2	24/04/2025, 16:31	70	Harry Potter 3	Silent Reading	Local Library Reading Room
3	24/04/2025, 10:14	79	coffee book	Read Aloud (Student to Volunteer)	test location
4	24/04/2025, 10:13	60	burger book	Read Aloud (Student to Volunteer)	test location
5	23/04/2025, 22:20	60	burger book	Read Aloud (Volunteer to Student)	test location
6	23/04/2025, 20:52	60	book test	Read Aloud (Student to Volunteer)	test location
7	23/04/2025, 20:52	60	book test	Read Aloud (Student to Volunteer)	test location
8	23/04/2025, 16:20	50	book test	In Progress	test location
9	16/04/2025, 16:28	60	book test	In Progress	test location
10	15/04/2025, 12:00	20	book test		test location

View All

### Combined Efficiency:

These features allow staff (like Literacy Specialists) viewing a Student record to quickly understand their status via the Path and immediately launch the flow to log a new session, streamlining data entry and ensuring student records stay current.

### 3. Core Automation (Flows)

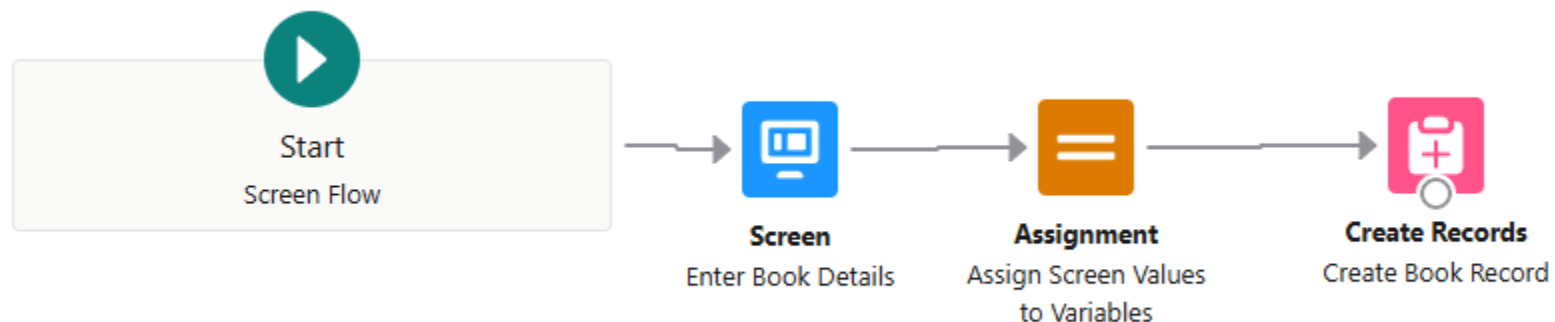
Three essential flows were implemented in Phase 1 to automate key processes:

#### 3.1 Flow 1: Book Creator (Subflow)

**Purpose:** Allows users to create a new Book\_\_c record directly from within the session logging process **if the required book doesn't exist**.

**Mechanism:** This is a Screen Flow configured to run in **System Context Without Sharing**. This allows users (like Volunteers/Specialists) who may not have direct Create permissions on the Book object to still add necessary books. It collects book details (Title, Author, Level, etc.) via a screen and creates the **Book\_\_c** record.

**Output:** It returns the Record ID of the newly created Book\_\_c back to the calling flow.

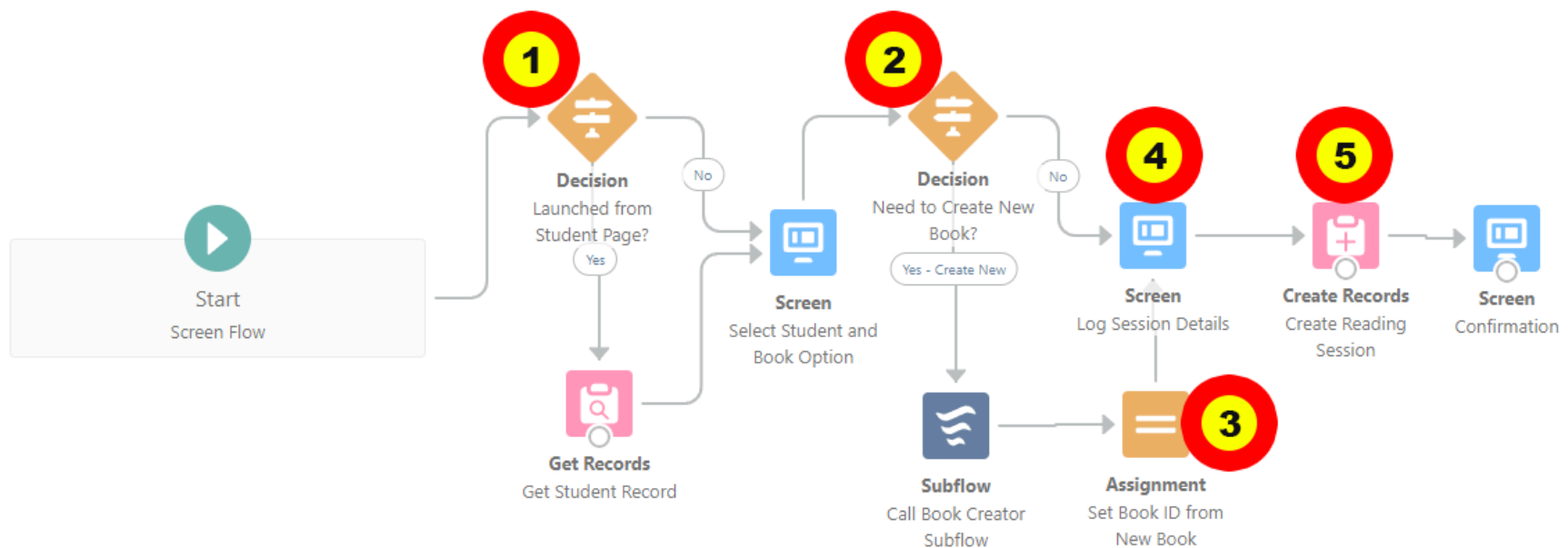


### 3.2 Flow 2: Quick Session Entry (Screen Flow)

**Purpose:** Provides the primary user interface for logging new **Reading\_Session\_\_c** records.

**Mechanism:** This Screen Flow runs in **User Context**, this **limits access and visibility** of student records to ensuring they **only see the students they’re responsible for**.

1. It checks if launched from a Student record page; if yes, it uses the current recordId to **auto-fill the Student lookup**.
2. It asks the user if they need to add a new book. If 'Yes' is chosen, it calls the **Book Creator subflow**.
3. It uses the **Book ID** (either selected by the user from an existing book or returned by the Book Creator subflow) to **auto-fill the Book lookup** on the detail entry screen.
4. It then collects remaining session details (DateTime, Duration, Status, Mode, Focus Area, Location, Notes).
5. It creates **Reading\_Session\_\_c** record, linking it to the correct **Student, Book, and Location**



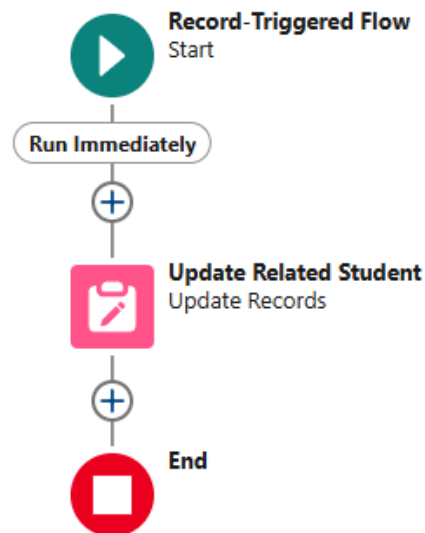
### 3.3 Flow 3: Student Last-Session Updater (Record-Triggered Flow)

**Purpose:** Keeps key fields on the **Student\_\_c** record updated automatically based on the most recent session activity.

**Mechanism:** This flow runs **after-save** whenever a **Reading\_Session\_\_c** record is created or updated.

**Trigger Conditions:** It triggers *specifically* if the **record is new** OR **if the Session\_DateTime\_\_c or Focus\_Area\_\_c fields are changed**, AND **the Session\_DateTime\_\_c field is not blank**.

**Action:** It efficiently updates the related parent **Student\_\_c** record, setting the **Last\_Session\_DateTime\_\_c** and **Latest\_Session\_Focus\_Area\_\_c** fields with the values directly from the triggering Session record. This **ensures the Student Path and reporting fields are always current**.



## 4. Security & Access Model

A role-based security model using Permission Set Groups was established:

**Role Hierarchy:** A basic role (**Literacy Program Staff**) was created.

**Profile:** A custom profile (**Literacy Program User**) cloned from 'Standard User' provides minimal baseline access.

### Permission Sets:

#### 1. Literacy Program Core Access:

- Grants **Create, Edit, Update, Delete (CRUD)** on **custom objects (Student, Session, Book, Location)**
- **Read-Only** on standard **Account/Contact** (for lookups)
- Run Flows permission, and necessary App/Tab visibility

#### 2. Account & Contact Management - Literacy Program:

- Grants **Create/Edit** permissions on standard **Account/Contact** objects.

### Permission Set Groups:

1. **Literacy Specialist:** Contains only **Literacy Program Core Access**. Assigned to standard users.
2. **Literacy Program Manager:** Contains **both Literacy Program Core Access AND Account & Contact Management - Literacy Program**. Assigned to users needing to manage partner data.

## 5. Next Steps

### Phase 2 Goal:

Extend the system to support formal **reading assessments, student confidence tracking, and milestone generation.**

This phase will introduce:

- Structured flows for capturing **Reading Assessments and Confidence Surveys**
- **Automated synchronization** of the Student’s primary reading level **based on their latest assessment**
- Declarative logic to **generate Reading Milestones triggered by progress indicators** (e.g. level advancement, cumulative minutes, session count)

The focus remains on scalable, declarative solutions that maintain data integrity while enriching insight and motivation across the programme.